ABSTRACT OF THE DISCLOSURE

A detector detects, in read data, a servo address mark of a type indicated by a register. Every time a SAM is detected during a self servo process, a CPU carries out tracking control in accordance with corresponding servo data. The CPU causes a head to write a corresponding type of additional servo data item in a disk at a position offset from the position of servo data containing the detected SAM, by a predetermined distance in a circumferential direction of the disk. Every time sets of servo data, each consisting of various types of data items, are written in the disk, the head is moved by a predetermined pitch in a radial direction of the disk.